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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
09/831,056	05/04/2001	Wilfried Merkel	1535	1161

7590 08/29/2003
Striker Striker & Stenby
103 East Neck Road
Huntington, NY 11743

EXAMINER

COLE, LAURA C

ART UNIT PAPER NUMBER

1744

DATE MAILED: 08/29/2003

Please find below and/or attached an Office communication concerning this application or proceeding.

Office Action Summary

Application N .

09/831,056

Applicant(s)

MERKEL ET AL.

Examiner

Laura C Cole

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-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133).
- Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☒ Responsive to communication(s) filed on 04 May 2001 .
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 1-11 is/are pending in the application.
- 4a) Of the above claim(s) _____ is/are withdrawn from consideration.
- 5) ☐ Claim(s) _____ is/are allowed.
- 6) ☒ Claim(s) 1-11 is/are rejected.
- 7) ☐ Claim(s) _____ is/are objected to.
- 8) ☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☒ The specification is objected to by the Examiner.
- 10) ☒ The drawing(s) filed on 04 May 2001 is/are: a) ☐ accepted or b) ☒ objected to by the Examiner.
- Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
- 11) ☐ The proposed drawing correction filed on _____ is: a) ☐ approved b) ☐ disapproved by the Examiner.
- If approved, corrected drawings are required in reply to this Office action.
- 12) ☐ The oath or declaration is objected to by the Examiner.

Priority under 35 U.S.C. §§ 119 and 120

- 13) ☒ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☒ All b) ☐ Some * c) ☐ None of:
1. ☒ Certified copies of the priority documents have been received.
 2. ☐ Certified copies of the priority documents have been received in Application No. _____ .
 3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).
- * See the attached detailed Office action for a list of the certified copies not received.
- 14) ☐ Acknowledgment is made of a claim for domestic priority under 35 U.S.C. § 119(e) (to a provisional application).
- a) ☐ The translation of the foreign language provisional application has been received.
- 15) ☐ Acknowledgment is made of a claim for domestic priority under 35 U.S.C. §§ 120 and/or 121.

Attachment(s)

- | | |
|--|--|
| 1) <input checked="" type="checkbox"/> Notice of References Cited (PTO-892) | 4) <input type="checkbox"/> Interview Summary (PTO-413) Paper No(s). _____ . |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948) | 5) <input type="checkbox"/> Notice of Informal Patent Application (PTO-152) |
| 3) <input checked="" type="checkbox"/> Information Disclosure Statement(s) (PTO-1449) Paper No(s) <u>4</u> . | 6) <input type="checkbox"/> Other: |

DETAILED ACTION

Drawings

1. The drawings are objected to as failing to comply with 37 CFR 1.84(p)(5) because they include the following reference sign(s) not mentioned in the description: "32" and "36". A proposed drawing correction, corrected drawings, or amendment to the specification to add the reference sign(s) in the description, are required in reply to the Office action to avoid abandonment of the application. The objection to the drawings will not be held in abeyance.

Specification

2. Applicant is reminded of the proper language and format for an abstract of the disclosure.

The abstract should be in narrative form and generally limited to a single paragraph on a separate sheet within the range of 50 to 150 words. It is important that the abstract not exceed 150 words in length since the space provided for the abstract on the computer tape used by the printer is limited. The form and legal phraseology often used in patent claims, such as "means" and "said," should be avoided. The abstract should describe the disclosure sufficiently to assist readers in deciding whether there is a need for consulting the full patent text for details.

The language should be clear and concise and should not repeat information given in the title. It should avoid using phrases which can be implied, such as, "The disclosure concerns," "The disclosure defined by this invention," "The disclosure describes," etc.

The abstract of the disclosure is objected to because the abstract has multiple paragraphs. Correction is required. See MPEP § 608.01(b).

3. The disclosure is objected to because of the following informalities:

Page 1 Line 5 makes reference to "claim 1" which is improper as part of the specification.

Page 4 there are four occurrences of the symbol "[*]" in Lines 1, 17, 21, and 29 and one occurrence on Page 5 Line 2. Is there a portion of language not included in the specification?

Appropriate correction is required.

Claim Rejections - 35 USC § 112

The following is a quotation of the second paragraph of 35 U.S.C. 112:

The specification shall conclude with one or more claims particularly pointing out and distinctly claiming the subject matter which the applicant regards as his invention.

4. Claims 1-11 are rejected under 35 U.S.C. 112, second paragraph, as being indefinite for failing to particularly point out and distinctly claim the subject matter which applicant regards as the invention.

Claim 1 Line 3 recites that "the drive shaft is made from an extruded light metal." It is unclear as to what materials are included in the limitation of a "light metal." Applicant is reminded that the "harder material" is defined as steel, bronze, or copper (Claim 2).

Claim 7 recites the limitation "the adapter piece" in Line 3. There is insufficient antecedent basis for this limitation in the claim.

Claim 7 is unclear as the connection part could be seated on a protrusion of the base body "or" the adapter piece.

Claim 8 recites "the drive shaft...in that *it* has at least one longitudinal conduit." Is "*it*" referring to the drive shaft?

Claim 11 recites the limitation "the longitudinal direction" in Line 3. There is insufficient antecedent basis for this limitation in the claim.

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Regarding Claim 11 Line 5, the phrase "or the like" renders the claim(s) indefinite because the claim(s) include(s) elements not actually disclosed (those encompassed by "or the like"), thereby rendering the scope of the claim(s) unascertainable. See MPEP § 2173.05(d).

Claim Rejections - 35 USC § 103

The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

5. Claims 1, 3, and 4 are rejected under 35 U.S.C. 103(a) as being obvious over Zimmer, USPN 6,558,066.

The applied reference has a common assignee with the instant application. Based upon the earlier effective U.S. filing date of the reference, it constitutes prior art only under 35 U.S.C. 102(e). This rejection under 35 U.S.C. 103(a) might be overcome by: (1) a showing under 37 CFR 1.132 that any invention disclosed but not claimed in the reference was derived from the inventor of this application and is thus not an invention "by another"; (2) a showing of a date of invention for the claimed subject matter of the application which corresponds to subject matter disclosed but not claimed in the reference, prior to the effective U.S. filing date of the reference under 37 CFR 1.131; or (3) an oath or declaration under 37 CFR 1.130 stating that the application and reference are currently owned by the same party and that the inventor named in the application is the prior inventor under 35 U.S.C. 104, together with a terminal disclaimer

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in accordance with 37 CFR 1.321(c). For applications filed on or after November 29, 1999, this rejection might also be overcome by showing that the subject matter of the reference and the claimed invention were, at the time the invention was made, owned by the same person or subject to an obligation of assignment to the same person. See MPEP § 706.02(I)(1) and § 706.02(I)(2).

Zimmer discloses a device for fixing a drive shaft of a wiper system that comprises a drive shaft for a windshield wiper (14) that is fastened to a crank (74), a connection part (18) that has a screw thread (what the knurled protrusions shown on (18) in Figure 11 appear to be) that is of a harder material (Column 2 Lines 47-51). The connection part has a conical seat with fluting, wherein the fluting is the polygonal slaving profile (Column 5 Lines 57-64; Figure 3). Zimmer does not disclose a specific material for comprising the drive shaft.

It would have been obvious for one of ordinary skill in the art to choose a material such as a light metal (lighter than an aluminum alloy) since it has been held to be within the general skill of a worker in the art to select a known material on the basis of its suitability for the intended use as a matter of obvious engineering choice. In re Leshin, 125 USPQ 416. Furthermore, it would have been obvious for one of ordinary skill in the art to choose a material based on its cost in order to reduce manufacturing costs.

6. Claims 1, 2, and 4 are rejected under 35 U.S.C. 103(a) as being unpatentable over Berge et al., USPN 5,699,582.

Berge et al. disclose a locking and sealing washer apparatus that comprises a drive shaft (12) fastened to a crank (Column 2 Lines 46-69) and a connection part (38)

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that has a screw thread (See Figure 4 inner portion of (38)) and a polygonal slaving profile (Figure 4 outer portion of (38)). Berge et al. do not disclose a specific material for comprising the drive shaft or for the connection part.

It would have been obvious for one of ordinary skill in the art to choose a material such as a light metal (lighter than an aluminum alloy) for the drive shaft and a steel, bronze, or copper nut as they are well known in the art, since it has been held to be within the general skill of a worker in the art to select a known material on the basis of its suitability for the intended use as a matter of obvious engineering choice. In re Leshin, 125 USPQ 416. Furthermore, it would have been obvious for one of ordinary skill in the art to choose a material based on its cost in order to reduce manufacturing costs.

7. Claims 1, 4, 5, 7, and 8 are rejected under 35 U.S.C. 103(a) as being unpatentable over Neufeld, USPN 2,714,739.

Neufeld discloses an assembly for vehicle windshield cleaning systems that comprises a drive shaft (31) that is fastened to a crank (37) and a connection part (53) that has a screw thread (54) and a polygonal slaving profile (61). The base body has a conical protrusion (32) onto which the connection part is placed and is joined by "press-fitting" the connector into assisted by the threaded portion (Figure 3). The connection part is seated on the longitudinally fluted protrusion (32). Also disclosed is at least one longitudinal conduit (34, 55, 59). Neufeld does not disclose a specific material for comprising the drive shaft or for the connection part.

It would have been obvious for one of ordinary skill in the art to choose a material such as a light metal (lighter than an aluminum alloy) for the drive shaft and a steel, since it has been held to be within the general skill of a worker in the art to select a known material on the basis of its suitability for the intended use as a matter of obvious engineering choice. In re Leshin, 125 USPQ 416. Furthermore, it would have been obvious for one of ordinary skill in the art to choose a material based on its cost in order to reduce manufacturing costs.

Allowable Subject Matter

8. Claims 6 and 9-11 are objected to as being dependent upon a rejected base claim, but would be allowable if rewritten in independent form including all of the limitations of the base claim and any intervening claims.

None of the prior art above or mentioned below provides a teaching for a connection part cast with the base via an adapter piece, the base and connection part or the crank are chemically nickel-plated, or wherein there is a region on the base body with fluting where the crank of a harder material is cast with a connecting layer of zinc.

Conclusion

9. The prior art made of record and not relied upon is considered pertinent to applicant's disclosure.

USPN 3,085,821 to Ryck discloses a steel drive shaft, a base body, a connection part of a non-ferrous metal (Column 3 Line 1) and a conical seat with fluting, and the connection appears to be press-fit. Ryck does not disclose that the connection part has a threaded connection or a crank attached to the drive shaft.

USPN 6,227,747 to Remington et al. in Figure 2 displays a windshield wiper drive shaft that has a very similar structure to that of the Applicants invention when assembled and further states that portion (14) is separate from the base body. However it does not state that the connection (14) has threads, is of a different material, or is attached to a crank.

USPN 3,962,744 to Bien et al. disclose a locking and sealing washer apparatus that comprises a drive shaft (15), crank, and a connection part (17) made separate from the shaft. Bien et al. does not disclose that the connection part has threads, what materials the shaft and connection part are constructed of, how the connection part is attached to the shaft, or an adapter piece.

10. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Laura C Cole whose telephone number is (703) 305-7279. The examiner can normally be reached on Monday-Thursday, 7am - 4:30pm, alternating Fridays.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Robert Warden can be reached on (703) 308-2920. The fax phone number for the organization where this application or proceeding is assigned is (703) 872-9306.

Any inquiry of a general nature or relating to the status of this application or proceeding should be directed to the receptionist whose telephone number is (703) 308-0661.

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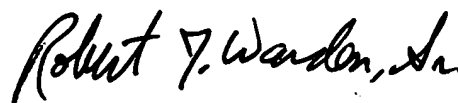
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LCC

LCC

20 August 2003

A handwritten signature in black ink, reading "Robert J. Warden, Sr." in a cursive script.

ROBERT J. WARDEN, SR.
SUPERVISORY PATENT EXAMINER
TECHNOLOGY CENTER 1700